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RABIN & Berdo, PC  
1101 14TH STREET, NW  
SUITE 500  
WASHINGTON, DC 20005

EXAMINER
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LEE, JOHN J

ART UNIT	PAPER NUMBER
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2618

MAIL DATE	DELIVERY MODE
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08/24/2007

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	Application No. 10/648,782	Applicant(s) TAKAYAMA ET AL.	
	Examiner JOHN J. LEE	Art Unit 2618	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 30 May 2007.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-17 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-17 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
     Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
     Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                     | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____                                      |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____  | 6) <input type="checkbox"/> Other: _____                          |

## DETAILED ACTION

### *Response to Arguments/Amendment*

1. Applicant's arguments/amendments received on May 30, 2007 have been carefully considered but they are not persuasive because the teaching of all the cited reference reads on all the rejected and amended claims as set forth in the pervious rejection. Therefore, the finality of this Office Action is deemed proper.

Contrary to the assertions at pages 6 - 8 of the Arguments, claims 1, 7, and 15 are not patentable.

During examination, the USPTO must give claims their broadest reasonable interpretation.

Re claims 1, 7, and 15: Applicant argues that the combination of teaching of Satoda (US 2004/0031063) and Kim (US 6,083,009) do not teach the claimed invention "a conversion circuit receiving image signals or sound signals prepared on the basis of the image data or sound data, and converting the image signals or sound signals into TV broadcasting signals". However, The Examiner respectfully disagrees with Applicant's assertion that the combination of teaching of Satoda and Kim do not teach the claimed invention. Contrary to Applicant's assertion, the Examiner is of the opinion that Satoda teaches enabling a user to be able to look at and listen to television programs their mobile terminals (telephones), and to join conversation or conference images of television programs means the mobile telephone receives the image or sound signal by requested from broadcast server and converts into a suitable form such that television broadcast signal as see (Fig. 1, 2 and pages 2, paragraphs 13 and pages 6, paragraphs 78), regarding

the claimed limitation. More specifically, a mobile system, mobile terminal including wired connection (or connected like a modular of telephone) between mobile telephone and the broadcast receiver/transmitter (the broadcast communication device could be integrated with the mobile telephone), communicates to broadcast network and the mobile telephone and the broadcast receiver/transmitter perform as like mobile terminal to operates receiving and transmitting the TV broadcast signals (pages 5, paragraphs 56 and Fig. 1). Furthermore, Kim also teaches a karaoke device integrated with a mobile terminal performs converting the received TV broadcast signal (the image and sound signal) to the suitable form (column 5, lines 45 – column 6, lines 39). It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the Satoda system as taught by Kim, provide the motivation to achieve enhancing karaoke service for wireless device in mobile communication system. Applicant also argues the limitation “a transmission circuit receiving the TV broadcasting signals and transmitting the TV broadcasting signals from an output port” fails to teach by combination of teaching of Satoda and Kim. However, Satoda teaches a transmission circuit (communicator transmits the TV broadcast signals to other mobile terminals or broadcast receiver transmits/receives the TV broadcast signals with transmitter or the transmitter receives the TV broadcast signals from converter) receives the TV broadcast signals from the data transmitter or other mobile terminal (see Fig. 1 pages 5, paragraphs 62 – pages 6, paragraphs 73), regarding the claimed limitation. Moreover, Applicant argues that the combination of teaching of Satoda and Kim do not teach the claimed invention “storing karaoke musical piece data and converting sound signals generated

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from the karaoke musical piece data and audio stung into the microphone”. However, The Examiner respectfully disagrees with Applicant’s assertion that the combination of teaching of Satoda and Kim do not teach the claimed invention. Contrary to Applicant’s assertion, the Examiner is of the opinion that Kim teaches a memory for storing karaoke data having sound and lyrics data, a key input section for generating a stored file executing mode signal or new music download mode signal and for generating a signal indicative of download request to selected music, and audio outputting section for mixing and outputting the sound data stored in the memory and a voice generated by a microphone, and converting the wards data stored in the memory (Fig. 2, 4 and column 3, lines 21 – 55). It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the Satoda system as taught by Kim, provide the motivation to improve wireless signal adaptability for karaoke signal or music in mobile device.

Applicant’s attention is directed to the rejection below for the reasons as to why this limitation is not patentable.

***Claim Rejections - 35 USC § 103***

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. **Claims 1 – 17** are rejected under 35 U.S.C. 103(a) as being unpatentable over Satoda et al. (US 2004/0031063) in view of Kim et al. (US 6,083,009).

Regarding **claim 1**, Satoda discloses that a cellular telephone (MS) (200 in Fig. 1 and pages 6, paragraphs 83). Satoda teaches that a radio communication circuit (communication unit Fig. 1) to transmit and receive radio signals (transmitting/receiving radio signals between mobile terminals in Fig. 1) for radio communication the radio communication circuit receiving communication data that include image data or sound data (see Fig. 1 pages 5, paragraphs 62 – pages 6, paragraphs 73, where teaches a transmission circuit (communicator transmits the TV broadcast signals to other mobile terminals or broadcast receiver transmits/receives the TV broadcast signals with transmitter or the transmitter receives the TV broadcast signals from converter) receives the TV broadcast signals from the data transmitter or other mobile terminal). Satoda teaches that a conversion circuit receiving image signals or sound signals prepared on the basis of the image data or sound data (enabling a user to be able to look at and listen to television programs their mobile terminals (telephones), and to join conversation or conference images of television programs means the mobile telephone receives the image or sound signal by requested from broadcast server and converts into a suitable form such that television broadcast signal as see (Fig. 1, 2 and pages 2, paragraphs 13 and pages 6, paragraphs 78)), and converting (reproducing suitable image or sound signal) the image signals or sound signals into TV broadcasting signals (pages 6, paragraphs 80 – 83 and Fig. 3, where teaches converting for reproducing the image or sound signal for suitable image or sound signal to communicate the other receiver). Satoda teaches that

transmission circuit receiving the TV broadcasting signals and transmitting the TV broadcasting signals (image or sound signal) from an output port (see Fig. 1 pages 5, paragraphs 62 – pages 6, paragraphs 73, where teaches a transmission circuit (communicator transmits the TV broadcast signals to other mobile terminals or broadcast receiver transmits/receives the TV broadcast signals with transmitter or the transmitter receives the TV broadcast signals from converter) receives the TV broadcast signals from the data transmitter or other mobile terminal). Satoda teaches that the cellular telephone (200 in Fig. 1) has a function of reproducing image signals or sound signals (pages 6, paragraphs 81 – 83, Fig. 5, and pages 8, paragraphs 105, where teaches the mobile terminal reproduced the image/sound signal (TV broadcasting signal) for transmitting associated wireless receivers), corresponding to execution of a karaoke function or a game function (Fig. 5 and pages 8, paragraphs 105, where teaches could be executing the game, karaoke function or movie, event program function by received the TV program data).

Satoda does not specifically disclose the limitation “broadcasting images and sound (TV program) signals to a TV receiver corresponding to execution of a karaoke function and/or a game function”. However, Kim teaches the limitation “broadcasting images and sound (TV program) signals to a TV receiver (214 in Fig. 2) corresponding to execution of a karaoke function (202 in Fig. 2) and/or a game function” (column 4 lines 50-63, Fig. 2, where teaches the karaoke device communicating with mobile station and TV receiver to execute of karaoke function by receiving image/sound signals). It would have been obvious to one having ordinary skill in the art at the time the invention was

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made to modify the Satoda system as taught by Kim, provide the motivation to achieve enhancing karaoke service for wireless device in mobile communication system.

Regarding **claim 2**, Satoda teaches that the conversion circuit enlarges or reduces a display size of image data to a display size corresponding to a display screen of the cellular telephone or a TV receiver that receives the TV broadcasting signals (pages 6, paragraphs 69, Fig. 4, and pages 7, paragraphs 91, where teaches converting a form of the broadcast data into proper form for being displayed a small screen of the mobile terminal by suitable form such as upper half of screen or reduced of the images to display).

Regarding **claim 3**, Satoda as modified by Kim teaches all the limitations as applied to claims 1 and 2 above and also Satoda teaches that the conversion circuit is are implemented so as to correspond to information on image display size, contained in software or data (broadcast information) (pages 6, paragraphs 78-79, Fig. 3, and pages 7, paragraphs 91, where teaches converting a form of the broadcast data, including program guide or program-relate data, into proper form for being displayed a small screen of the mobile terminal by suitable form such as upper half of screen or reduced size of the images to display), for executing the karaoke function or the game function (Fig. 5 and pages 8, paragraphs 105, where teaches could be executing the game, karaoke function or movie, event program function by received the TV program data).

Satoda does not specifically disclose the limitation "broadcasting images and sound (TV program) signals to a TV receiver corresponding to execution of a karaoke function and/or a game function". However, Kim teaches the limitation "broadcasting images and sound (TV program) signals to a TV receiver (214 in Fig. 2) corresponding to



execution of a karaoke function (202 in Fig. 2) and/or a game function” (column 4 lines 50-63, Fig. 2, where teaches the karaoke device communicating with mobile station and TV receiver to execute of karaoke function by receiving image/sound signals). It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the Satoda system as taught by Kim, provide the motivation to achieve enhancing karaoke service for wireless device in mobile communication system.

Regarding **claim 4**, Satoda teaches that a circuit to mix the sound signals with sound signals received from at least one other cellular telephone (pages 8, paragraphs 99-100 and Fig. 5, where teaches mixing television sound and communication sound to each other, and outputs the thus mixed sound through the sound output device, similarly to the mobile terminals).

Regarding **claim 5**, Satoda teaches that the sound signals are transferred after the mixing to the at least one other cellular telephone (pages 8, paragraphs 99-100 and Fig. 5, where teaches the reproduction controller of mobile station mixed television sound and communication sound to each other, and outputs the thus mixed sound through the sound output device, and transmitting similarly to another mobile terminals).

Regarding **claim 6**, Satoda teaches that inputting manipulation signals (instruction data or program guide signal) received from at least one other cellular telephone (200 in Fig. 1) (pages 6, paragraphs 78 and 83 and Fig. 3, where teaches converting a form of the broadcast data, including program guide or program-relate data (instruction data) that should be received from other mobile terminal or TV broadcasting server, into proper form for being displayed a small screen of the mobile terminal by suitable form such as

upper half of screen or reduced size of the images to display) in response to execution of the karaoke function or the game function (Fig. 5 and pages 8, paragraphs 105, where teaches could be executing the game, karaoke function or movie, event program function by received the TV program data).

Satoda does not specifically disclose the limitation “broadcasting images and sound (TV program) signals to a TV receiver corresponding to execution of a karaoke function and/or a game function”. However, Kim teaches the limitation “broadcasting images and sound (TV program) signals to a TV receiver (214 in Fig. 2) corresponding to execution of a karaoke function (202 in Fig. 2) and/or a game function” (column 4 lines 50-63, Fig. 2, where teaches the karaoke device communicating with mobile station and TV receiver to execute of karaoke function by receiving image/sound signals). It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the Satoda system as taught by Kim, provide the motivation to achieve enhancing karaoke service for wireless device in mobile communication system.

Regarding **claim 7**, Satoda discloses that a cellular telephone (MS) (200 in Fig. 1 and pages 6, paragraphs 83). Satoda teaches that means for communicating by radio with a base station (cellular telephone network (pages 5, paragraphs 55) or 100 in Fig. 1) during a telephone call or during downloading of karaoke musical piece data or game data (Fig. 1 and pages 3, paragraphs 33 – 34, where teaches the mobile station, wireless telephone, communicates with a TV broadcasting server or cellular communication network, during the telephone call, for communicating reproduced broadcast image and sound to other wireless receiver). Satoda teaches that conversion circuit converting

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(reproducing suitable image or sound signal) image signals or sound signals derived from downloaded musical piece data or game data into TV broadcasting signals (pages 6, paragraphs 80 – 83 and Fig. 3, where teaches reproducing the image or sound signal for suitable image or sound signal to communicate the other receiver). Satoda teaches that transmission circuit transmitting the TV broadcasting signals (image or sound signal) to a TV receiver (pages 8, paragraphs 104 - 105 and Fig. 5, where teaches transmitting TV broadcasting signal (the image or sound signal) to a mobile receiver that can be listened or looked a television program). Satoda teaches that the cellular telephone (200 in Fig. 1) has a function of reproducing image signals and/or sound signals (pages 6, paragraphs 81 – 83, Fig. 5, and pages 8, paragraphs 105, where teaches the mobile terminal reproduced the image/sound signal (TV broadcasting signal) for transmitting associated wireless receivers), corresponding to execution of a karaoke function and/or a game function (Fig. 5 and pages 8, paragraphs 105, where teaches could be executing the game, karaoke function or movie, event program function by received the TV program data).

Satoda does not specifically disclose the limitation “broadcasting images and sound (TV program) signals to a TV receiver corresponding to execution of a karaoke function and/or a game function”. However, Kim teaches the limitation “broadcasting images and sound (TV program) signals to a TV receiver (214 in Fig. 2) corresponding to execution of a karaoke function (202 in Fig. 2) and/or a game function” (column 4 lines 50-63, Fig. 2, where teaches the karaoke device communicating with mobile station and TV receiver to execute of karaoke function by receiving image/sound signals). It would have been obvious to one having ordinary skill in the art at the time the invention was

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made to modify the Satoda system as taught by Kim, provide the motivation to achieve enhancing karaoke service for wireless device in mobile communication system.

Regarding **claim 8**, Satoda teaches that the conversion circuit enlarges or reduces a display size of image data to a display size corresponding to a display screen of the cellular telephone or the TV receiver (pages 6, paragraphs 69, Fig. 4, and pages 7, paragraphs 91, where teaches converting a form of the broadcast data into proper form for being displayed a small screen of the mobile terminal by suitable form such as upper half of screen or reduced size of the images to display).

Regarding **claim 9**, Satoda as modified by Kim teaches all the limitations as applied to claims 1 and 2 above and also Satoda teaches that the conversion circuit is implemented so as to correspond to information on image display size, contained in software or data (broadcast information) (pages 6, paragraphs 78-79, Fig. 3, and pages 7, paragraphs 91, where teaches converting a form of the broadcast data, including program guide or program-relate data, into proper form for being displayed a small screen of the mobile terminal by suitable form such as upper half of screen or reduced size of the images to display), for executing the karaoke function or the game function (Fig. 5 and pages 8, paragraphs 105, where teaches could be executing the game, karaoke function or movie, event program function by received the TV program data).

Satoda does not specifically disclose the limitation "broadcasting images and sound (TV program) signals to a TV receiver corresponding to execution of a karaoke function and/or a game function". However, Kim teaches the limitation "broadcasting images and sound (TV program) signals to a TV receiver (214 in Fig. 2) corresponding to

execution of a karaoke function (202 in Fig. 2) and/or a game function” (column 4 lines 50-63, Fig. 2, where teaches the karaoke device communicating with mobile station and TV receiver to execute of karaoke function by receiving image/sound signals). It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the Satoda system as taught by Kim, provide the motivation to achieve enhancing karaoke service for wireless device in mobile communication system.

Regarding **claim 10**, Satoda teaches that a mixing circuit (reproduction controller (209) in Fig. 1) mixing the sound signals with sound signals received from at least one other cellular telephone (pages 8, paragraphs 99-100 and Fig. 5, where teaches mixing television sound and communication sound to each other, and outputs the thus mixed sound through the sound output device, similarly to the mobile terminals).

Regarding **claim 11**, Satoda teaches that transfer circuit (204 in Fig. 1) transferring signals after the mixing to the at least one other cellular telephone (pages 8, paragraphs 99-100 and Fig. 5, where teaches the reproduction controller of mobile station mixed television sound and communication sound to each other, and outputs the thus mixed sound through the sound output device, and transmitting similarly to another mobile terminals).

Regarding **claim 12**, Satoda teaches that an input circuit (201 in Fig. 1) inputting manipulation signals (instruction data or program guide signal) received from at least one other cellular telephone (200 in Fig. 1) (pages 6, paragraphs 78 and 83 and Fig. 3, where teaches converting a form of the broadcast data, including program guide or program-relate data (instruction data) that should be received from other mobile terminal or TV

broadcasting server, into proper form for being displayed a small screen of the mobile terminal by suitable form such as upper half of screen or reduced size of the images to display) in response to execution of the karaoke function or the game function (Fig. 5 and pages 8, paragraphs 105, where teaches could be executing the game, karaoke function or movie, event program function by received the TV program data).

Satoda does not specifically disclose the limitation “broadcasting images and sound (TV program) signals to a TV receiver corresponding to execution of a karaoke function and/or a game function”. However, Kim teaches the limitation “broadcasting images and sound (TV program) signals to a TV receiver (214 in Fig. 2) corresponding to execution of a karaoke function (202 in Fig. 2) and/or a game function” (column 4 lines 50-63, Fig. 2, where teaches the karaoke device communicating with mobile station and TV receiver to execute of karaoke function by receiving image/sound signals). It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the Satoda system as taught by Kim, provide the motivation to achieve enhancing karaoke service for wireless device in mobile communication system.

Regarding **claim 13**, Satoda teaches that communicating with a base station (cellular telephone network (pages 5, paragraphs 55) or 100 in Fig. 1) during a telephone call (Fig. 1 and pages 3, paragraphs 33 – 34, where teaches the mobile station, wireless telephone, communicates with a TV broadcasting server or cellular communication network, during the telephone call, for communicating reproduced broadcast image and sound to other wireless receiver).

Regarding **claim 14**, Satoda teaches the radio communication circuit communicates with a base station (cellular telephone network (pages 5, paragraphs 55) or 100 in Fig. 1) when the cellular telephone is used for a telephone call (Fig. 1 and pages 3, paragraphs 33 – 34, where teaches the mobile station, wireless telephone, communicates with a TV broadcasting server or cellular communication network, during the telephone call, for communicating reproduced broadcast image and sound to other wireless receiver).

Regarding **claim 15**, Satoda discloses that a cellular telephone (MS) (200 in Fig. 1 and pages 6, paragraphs 83). Satoda teaches that a microphone (input device (205) in Fig. 1 such that a microphone). Satoda teaches that mean for communicating with a base station (cellular telephone network (pages 5, paragraphs 55) or 100 in Fig. 1) during a telephone call by a person who uses the microphone (input device (205) in Fig. 1 such that a microphone) during the telephone call (pages 5, paragraphs 64, Fig. 1, and pages 3, paragraphs 33 – 34, where teaches the mobile station, wireless telephone, communicates with a TV broadcasting server or cellular communication network, during the telephone call with using the microphone by user, for communicating reproduced broadcast image and sound to other wireless receiver). Satoda teaches that storing karaoke musical piece data (broadcasting television program for sound and images data) received by the cellular telephone (200 in Fig. 1) via base station (cellular telephone network (pages 5, paragraphs 55) or 100 in Fig. 1) (pages 8, paragraphs 97-99, Fig. 3, and page 1, paragraphs 6, where teaches mobile telephone terminal receives from the base station, broadcast station, the broadcasting TV program (images and sound) data and stores in the

principal apparatus). Satoda teaches that converting (reproducing suitable image or sound signal) sound signals generated from the karaoke musical piece data (broadcasting television program for sound and images data) (pages 6, paragraphs 80 – 83 and Fig. 3, where teaches converting for reproducing the image or sound signal for suitable image or sound signal to communicate the other receiver) and audio signals sung into microphone (input device (205) in Fig. 1 such that a microphone) (pages 6, paragraphs 80 – 83 and Fig. 3, where teaches converting for reproducing the image or sound signal for suitable image or sound signal to communicate the other receiver and the sound signals into input device), when the person (user) uses the cellular telephone (200 in Fig. 1) in karaoke mode, into TV broadcasting signals (Fig. 5 and pages 8, paragraphs 105, where teaches could be executing the game, karaoke function or movie, event program function by received the TV program data). Satoda teaches that means for transmitting the TV broadcasting signals to a TV receiver (pages 8, paragraphs 104 - 105 and Fig. 5, where teaches transmitting TV broadcasting signal (the image or sound signal) to a mobile receiver that can be listened or looked a television program).

Satoda does not specifically disclose the limitation “broadcasting signals, karaoke musical piece data, receives and stores by a TV receiver, mobile terminal, when the person uses the TV receiver, mobile terminal, in karaoke mode”. However, Kim teaches the limitation “broadcasting signals, karaoke musical piece data, receives and stores by a TV receiver, mobile terminal, when the person uses the TV receiver, mobile terminal, in karaoke mode” (Fig. 4, column 4, lines 17-25, and column 4, lines 50 - 63, where teaches mobile terminal receives/downloads the karaoke signals or music and converts and stores



the audio sound signals for playing the music as executing the karaoke mode). It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the Satoda system as taught by Kim, provide the motivation to improve wireless signal adaptability for karaoke signal or music in mobile device.

Regarding **claim 16**, Satoda teaches that converting sound signals additionally comprises means for converting image signals generated (reproducing the images signals) from the karaoke musical piece data (broadcasting television program for sound and images data), and including the image signals in the TV broadcasting signals for display by the TV receiver (pages 6, paragraphs 80 – 83 and Fig. 3, where teaches converting for reproducing the broadcasting television program signal for sound and images signals for suitable image or sound signal, and could be executing the game, karaoke function or movie, event program function by received the TV program data).

Satoda does not specifically disclose the limitation “broadcasting signals, karaoke musical piece data, receives and stores by a TV receiver, mobile terminal, when the person uses the TV receiver, mobile terminal, in karaoke mode”. However, Kim teaches the limitation “broadcasting signals, karaoke musical piece data, receives and stores by a TV receiver, mobile terminal, when the person uses the TV receiver, mobile terminal, in karaoke mode” (Fig. 4, column 4, lines 17-25, and column 4, lines 50 - 63, where teaches mobile terminal receives/downloads the karaoke signals or music and converts and stores the audio sound signals for playing the music as executing the karaoke mode). It would have been obvious to one having ordinary skill in the art at the time the invention was

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made to modify the Satoda system as taught by Kim, provide the motivation to improve wireless signal adaptability for karaoke signal or music in mobile device.

Regarding **claim 17**, Satoda teaches that mixing audio signals received from another cellular telephone with the sound signals generated from the karaoke musical piece data (broadcasting television program for sound and images data) (pages 8, paragraphs 99-100 and Fig. 5, where teaches the reproduction controller of mobile station mixed television sound and communication sound to each other, and outputs the thus mixed sound through the sound output device, and transmitting similarly to another mobile terminals) and audio signals sung into the microphone (input device (205) in Fig. 1 such that a microphone) (pages 6, paragraphs 80 – 83 and Fig. 3, where teaches converting for reproducing the image or sound signal for suitable image or sound signal to communicate the other receiver and the sound signals into input device).

Satoda does not specifically disclose the limitation “broadcasting signals, karaoke musical piece data, receives and stores by a TV receiver, mobile terminal, when the person uses the TV receiver, mobile terminal, in karaoke mode”. However, Kim teaches the limitation “broadcasting signals, karaoke musical piece data, receives and stores by a TV receiver, mobile terminal, when the person uses the TV receiver, mobile terminal, in karaoke mode” (Fig. 4, column 4, lines 17-25, and column 4, lines 50 - 63, where teaches mobile terminal receives/downloads the karaoke signals or music and converts and stores the audio sound signals for playing the music as executing the karaoke mode). It would have been obvious to one having ordinary skill in the art at the time the invention was

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made to modify the Satoda system as taught by Kim, provide the motivation to improve wireless signal adaptability for karaoke signal or music in mobile device.

4. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

***Conclusion***

Any response to this action should be mailed to:

Commissioner of Patents and Trademarks  
Washington, D.C. 20231  
Or P.O. Box 1450  
Alexandria VA 22313

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or faxed (571) 273-8300, (for formal communications intended for entry)

Or: (703) 308-6606 (for informal or draft communications, please label "PROPOSED" or "DRAFT").

Hand-delivered responses should be brought to USPTO Headquarters, Alexandria, VA.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to **John J. Lee** whose telephone number is (571) 272-7880. He can normally be reached Monday-Thursday and alternate Fridays from 8:30am-5:00 pm. If attempts to reach the examiner are unsuccessful, the examiner's supervisor, **Edward Urban**, can be reached on (571) 272-7899. Any inquiry of a general nature or relating to the status of this application should be directed to the Group receptionist whose telephone number is (703) 305-4700.

J.L.  
August 17, 2007

John J Lee

  
**EDWARD F. URBAN**  
SUPERVISORY PATENT EXAMINER  
TECHNOLOGY CENTER 2600